# Mental Health, Well-being, Personality and Self-Efficacy in Adult Patients with Sleep Disorders

**A**

**SYNOPSIS**

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# INTRODUCTION

## SLEEP-DISORDER

### *Defining sleep disorder-*

A **sleep disorder** or **somnipathy**, is a medical disorder of the sleep patterns of a person or animal. Sleep disorders are problems with sleeping, including trouble falling or staying asleep, falling asleep at the wrong times, too much sleep, or abnormal behaviors during sleep (American Psychiatric Association, 2000). Some sleep disorders are serious enough to interfere with normal physical, mental and emotional functioning.

### *Classifying sleep disorders-*

Three major types of complaint described in the International Classification of Sleep Disorders (ICSD; American Sleep Disorders Association, 1997) are difficulty getting off to sleep or remaining asleep (insomnia); excessive daytime sleepiness; and episodes of disturbed behavior or experiences related to sleep (parasomnias).

### *Do people really have sleep disorders?*

The prevalence of restless leg syndrome has been reported to be between 5% and 15% with higher prevalence among elderly (**Partinen , 2005**).

A studies of a population in Central Pennsylvania showed that the prevalence of insomnia was 7.5% in general (**Bixler , 2002**).

According to data from the National Health Interview Survey, nearly 30% of adults reported an average of ≤6 hours of sleep per day in 2005-2007( **Schoenborn**, **2005–2007).**

In 2009, only 31% of high school students reported getting at least 8 hours of sleep on an average school night ( **CDC, Youth Risk Behavior Surveillance**, **2010)**.

A study describes the prevalence of the three common physician-diagnosed sleep disorders (insomnia, sleep apnea, and restless legs syndrome (RLS) by age, gender, and race in the US population. An estimated 50-70 million US adults have sleep or wakefulness disorder (**Institute of Medicine**, **2006).**

***Are there any gender differences in sleep?***

Women have better sleep quality compared to men, with longer sleep times, shorter sleep-onset latency and higher sleep efficiency. Despite this, women have more sleep-related complaints than men. The amount of slow-wave sleep decreases with age in men and women. Normal physiological periods like puberty, menstruation, pregnancy and menopause, are associated with alterations in women's sleep patterns. Studies of insomnia support a female predominance, with increased divergence of prevalence between men and women with older age. Restless legs syndrome has a slight female predominance, whereas rapid eye movement sleep behavior disorder and Kleine-Levin syndrome are more common in men *(***Krishnan, Collop, 2006**).

***Where do sleep disorders arise from?***

Data from the 2005–2006 by National Health and Nutrition Examination Survey, CDC, Atlanta, for 6,139 individuals over the age of 16 was analyzed for sleep-related parameters. This stated that sleep is often disrupted following a traumatic brain injury (TBI), which may compromise recovery and quality of life.

A Study by **Parish, et. al. (2009),** revealed that common medical problems are often associated with abnormalities of sleep. Patients with chronic medical disorders often have fewer hours of sleep and less restorative sleep compared to healthy individuals, and this poor sleep may worsen the subjective symptoms of the disorder. Individuals with lung disease often have disturbed sleep related to oxygen desaturations, coughing, or dyspnea. Both obstructive lung disease and restrictive lung diseases are associated with poor quality sleep. Awakenings from sleep are common in untreated or undertreated asthma, and cause sleep disruption. Gastroesophageal reflux is a major cause of disrupted sleep due to awakenings from heartburn, dyspepsia, acid brash, coughing, or choking. Patients

with chronic renal disease commonly have sleep complaints often due to insomnia, insufficient sleep, sleep apnea, or restless legs syndrome. Complaints related to sleep are very common in patients with fibromyalgia and other causes of chronic pain. Sleep disruption increases the sensation of pain and decreases quality of life. Patients with infectious diseases, including acute viral illnesses, HIV-related disease, and Lyme disease, may have significant problems with insomnia and hypersomnolence. Women with menopause insomnia, sleep-disordered breathing, restless legs syndrome, or fibromyalgia. Patients with cancer or receiving cancer therapy are often bothered by insomnia or other sleep disturbances that affect quality of life and daytime energy.

Results of a study showed that enuresis affected sleep disorder the most. Other factors affecting sleep disorder included difficulty staying asleep and tossing and turning in bed due to restless leg syndrome. The factors affecting were gender, age, duration of disease. **(Baik, J.S., 2012).**

A study by **Young**, **et.al. (2007),** measured sleep quality in premenopausal, perimenopausal, and postmenopausal women. Probability sample of 589 premenopausal, perimenopausal, and postmenopausal women recruited from state employee records. Menopausal status was determined by menstrual history, surgical history, and use of hormone replacement therapy. Sleep quality was objectively measured by full in-laboratory polysomnography and by self-reported sleep problems. Sleep quality was not worse in perimenopausal or postmenopausal women, compared with premenopausal women. To the contrary, postmenopausal woman had more deep sleep (16% vs 13% stages 3/4, $P < 0.001$) and significantly longer total sleep time (388 minutes vs 374 minutes, $P = 0.05$). Menopausal status was moderately related to self-reported dissatisfaction with sleep but was not consistently associated with symptoms of insomnia or sleepiness. Menopause is not associated with diminished sleep quality measured by polysomnography. Although perimenopausal and postmenopausal women, relative to premenopausal women, were less satisfied with their sleep, menopause was not a strong predictor of specific sleep-disorder symptoms. Symptoms and signs of sleep abnormalities in midlife women should not be attributed primarily to menopause before ruling out underlying sleep disorders.

A study by Cheng aimed to assess the relationship between sleep disturbance, mood, menopausal status, and vasomotor symptoms in a community-based sample of 1,113 Taiwanese women aged 43 to 57 years who were living on the island of Kinmen. Menopausal status was determined by menstrual history. 46% of middle-aged women reported feeling dissatisfied with their sleep. Generally, the occurrence of sleep problems or poor sleep quality was most prevalent in the postmenopausal group and least prevalent in premenopausal women ( **Cheng , et. al. ,2008**).

***Does environment affect sleep?***

Not only are psychiatric disorders themselves are capable of affecting sleep and wakefulness: certain psychotropic medications can have the same effect (**Obermeyer & Benca, 1996),** possibly adding to the patient's difficulties.

The exploding popularity of hand-held digital devices could lead to a big jump in sleep disorders, with experts warning the light emitted from digital screens can have a disturbing effect on the body clock. A recent study in the United States showed that devices such as laptops, smart phones and tablets emit approximately 30 to 50 lux, about half the illumination of an ordinary room light. Amongst this short wavelength blue light is the most disruptive, Body does not produce as much melatonin, which is produced when it is dark, helps regulate and promote sleep. Lack of sleep can affect alertness, concentration and memory. People who do not have enough of the hormone take longer to fall asleep.

"The extent of the response of the circadian clock will depend on how bright the light is - that is how far away the device is from the eyes - as well as what colors of light are being emitted," Most disruptive to the body clock is short wavelength blue light - exactly what backlit portable screens shine directly into the eyes. In addition, the devices are held close to the face and they are easily used in bed. (**Deborah**, **2013)**.

***How does poor quality of sleep affect one's life?***

A study by **US Department of Transportation (2011),** assessed the prevalence of unhealthy/sleep behaviors by selected sociodemographic factors and geographic variations in 12 states. The analysis determined that, among 74,571 adult respondents in 12 states, 35.3% reported <7 hours of sleep during a typical 24-hour period, 48.0% reported snoring, 37.9% reported unintentionally falling asleep during the day at least once in the preceding month, and 4.7% reported nodding off or falling asleep while driving at least once in the preceding month. This is the first CDC surveillance report to include estimates of drowsy driving and unintentionally falling asleep during the day. The National Department of Transportation estimates drowsy driving to be responsible for 1,550 fatalities and 40,000 nonfatal injuries annually in the United States.

**Howland**, e**t. al. (1997**), reported that Rapid Eye Movement (REM) sleep abnormalities have been implicated by some in a variety of psychiatric disorders, including post-traumatic stress disorder, some forms of schizophrenia and other neuropsychiatric disorders in which psychotic phenomena occur.

A study by **Rebecca** et al. (2007), indicates that sleep disturbances are associated with suicidal ideation and behaviors. Findings indicate that suicidal ideation and behaviors are closely associated with sleep complaints, and in some cases, this association exists above and beyond depression. Several cross-sectional investigations indicate a unique association between nightmares and suicidal ideation, whereas the relationship between insomnia and suicidality requires further study. Finally, it remains unclear whether or not sleep-oriented interventions may reduce risk for suicidal behaviors. Unlike other suicide risk factors, sleep complaints may be particularly amenable to treatment. As a warning sign, disturbances in sleep may thus be especially useful to research and may serve as an important clinical target for future suicide intervention efforts.

**Fava et al. (2004**) reported that insomnia and daytime sleepiness are often associated with depression. Insomnia and other sleep disturbances can be precursors to the onset of major depressive disorder, so they may act as risk factors for or predictors of depression. The symptomatology of depression also prominently includes insomnia, and sleep

disturbances may be residual symptoms after response to antidepressant treatment. Insomnia and the resultant daytime sleepiness may be short-term or long-term side effects of antidepressant treatment as well. Whether insomnia is a precursor, symptom, residual symptom, or side effect of depression or its treatment, clinicians must give serious attention to it and attempt to resolve sleep disturbances because of the risk of depression onset, worsening of depressive symptoms, and relapse of depression after response to antidepressant treatment. Remission of depression cannot be fully achieved until the associated insomnia and daytime sleepiness are resolved

***Should we or can we treat sleep disorders?***

A study by **Novak**, **et. al. (2006),** states that sleep complaints are very common in patients with end-stage renal disease (ESRD) and contribute to their impaired quality of life. Both obstructive and central sleep apnea syndromes are reported more often in patients on dialysis than in the general population. Impaired daytime functioning, sleepiness, and fatigue, as well as cognitive problems, are well known in patients with sleep apnea. Increasing evidence supports the pathophysiological role of sleep apnea in cardiovascular disorders, which are the leading cause of death in ESRD patients. Furthermore, treatment with continuous positive airway pressure may improve quality of life and may help to manage hypertension in these patients. Secondary restless legs syndrome is highly prevalent in patients on maintenance dialysis. In this article the researcher reviews the need of the diagnosis and treatment of sleep apnea and restless legs syndrome, with a focus on dialysis patients. The researcher also briefly review current data regarding sleep problems after transplantation, since these studies may indirectly shed light on the possible pathophysiological role of uremia or dialysis in the etiology of sleep disorders. Appropriate management of sleep disorders could improve the quality of life and possibly even impact upon survival of renal patients.

Findings of a study by **Morin** , et. al. (2006), assessed that psychological and behavioral factors play an important role in insomnia has led to increased interest in therapies targeting these factors. Psychological and behavioral therapies produced reliable changes in several sleep parameters of individuals with either primary insomnia or insomnia

associated with medical and psychiatric disorders. Study also documented the benefits of insomnia treatment in older adults. Sleep improvements achieved with treatment were well sustained over time. Five treatments met criteria for empirically-supported psychological treatments for insomnia: Stimulus control therapy, relaxation, paradoxical intention, sleep restriction, and cognitive-behavior therapy.

***Defining Mental Health***

According **World Health Organization** (WHO) mental health is not just the absence of mental disorder. It is defined as a state of well being in which every individual realizes his or her own potential, can cope with the normal stresses of life, can worked productively and fruitfully, and is able to make a contribution to her or his community.

Mental health refers to our cognitive, and/or emotional wellbeing - it is all about how we think, feel and behave. Mental health, if somebody has it, can also mean an absence of a mental disorder. Mental health also includes a person's ability to enjoy life - to attain a balance between life activities and efforts to achieve psychological resilience.

**Impact of Mental health**

**Sarah, et.al. (2013**) found that mental health was shown to be both a consequence of and risk factor for unemployment. Thus, the poorer mental health observed amongst people who are not working is attributable to both the impact of unemployment and existing mental health problems. While the strength of these two effects was similar for women, the results for men suggested that the effect of unemployment on subsequent mental health was weaker than the effect of mental health on subsequent risk of unemployment.

**Meier et.al. (2013),** examined short-term within-person effects of relationship and task conflict on angry mood and somatic complaints. The researcher found a prospective main effect of relationship conflict on angry mood, but not on somatic complaints. In contrast, controlling for relationship conflict, task conflict was unrelated to both angry mood and somatic complaints. Supporting our assumption, task conflict moderated the effect of

relationship conflict. Relationship conflict had a prospective effect on angry mood and somatic complaints that lasted until the next day if, and only if, task conflict was low.

***Defining Occupational Health***

"Occupational health should aim at: the promotion and maintenance of the highest degree of physical, mental and social well-being of workers in all occupations; the prevention amongst workers of departures from health caused by their working conditions; the protection of workers in their employment from risks resulting from factors adverse to health; the placing and maintenance of the worker in an occupational environment adapted to his physiological and psychological capabilities; and, to summarize, the adaptation of work to man and of each man to his job.

***How is occupational health affected?***

**Querstret,** et.al. (2012), examined the association among three conceptualizations of work-related rumination (affective rumination, problem-solving pondering, and detachment) with sleep quality and work-related fatigue. It was hypothesized that affective rumination and poor sleep quality would be associated with increased fatigue and that problem-solving pondering and detachment would be associated with decreased fatigue. The mediating effect of sleep quality on the relationship between work-related rumination and fatigue was also tested. Sleep quality partially mediated the relationship between affective rumination and fatigue and between problem-solving pondering and fatigue. Work-related affective rumination appears more detrimental to an individual's ability to recover from work than problem-solving pondering. In the context of identifying mechanisms by which demands at work are translated into ill-health, this appears to be a key finding and suggests that it is the type of work-related rumination, not rumination per se, is important.

**Hystad, et.al. (2011),** investigated the effects of psychological hardiness, job control, and job demands on medically certified sickness absence of civilian and military employees. After controlling for age, sex, and baseline absence, hardiness predicted both the likelihood of having any sickness absence (odds ratio = 0.97) and the number of absence

spells (a 6.5% decrease in the expected count for 1 standard deviation change in hardiness). In addition, an interaction was found among hardiness, job control, and psychological demands. When demands were high, high job control was associated with more absence among employees with low levels of hardiness. Together, these findings point to hardiness as an important individual resource in relation to health, and that it is necessary to consider individual differences when examining the effects of work characteristics.

A study by **Liu, et. al. (2008**), studied gender differences in job stress. The findings show there was a stronger relation between interpersonal conflicts and negative emotions/ job satisfaction were stronger for faculty than for staff.

A study by **Saksvik, et al. (2011),** examined sleep during adaptation and readaptation to different shift work schedules in the offshore oil industry. There were no significant differences between the shifts in readaptation in terms of sleep. To conclude, adaptation to swing shift was more difficult than adaptation to regular day and night shifts in terms of sleep. Readaptation to day work after 1 week of night work affected sleep negatively. There were no differences between the shift schedules the week after the work period.

A study by **Karlson**, **et al. (2009),** examined the effects of a change of shift schedule from a fast forward-rotating schedule to a slowly backward-rotating one. As predicted, on most dimensions measured the shift workers displayed clear improvements from initially poorer scores than daytime workers, and the daytime workers displayed no improvements.

***Does mental health have relation with occupation?***

**Wirtz, et al. (2013**), investigated whether occupational role stress is associated with differential levels of the stress hormone cortisol in response to acute psychosocial stress. Findings suggest that occupational role stress in terms of role uncertainty acts as a background stressor that is associated with increased HPA-axis reactivity to acute stress. This finding may represent a potential mechanism regarding how occupational role stress may precipitate adverse health outcomes.

A study by **Meier, et al. (2013),** examined short-term within-person effects of relationship and task conflict on angry mood and somatic complaints. Finding are a prospective main effect of relationship conflict on angry mood, but not on somatic complaints. In contrast, controlling for relationship conflict, task conflict was unrelated to both angry mood and somatic complaints. Supporting our assumption, task conflict moderated the effect of relationship conflict. Relationship conflict had a prospective effect on angry mood and somatic complaints that lasted until the next day if, and only if, task conflict was low.

The purpose of the study was to investigate the physical and psychological prerequisites of functioning as well as social environment at work and personal factors in relation to working ability and general subjective well-being in a group of office workers.

Forward flexion of the spine, intensity of musculoskeletal symptoms, self-confidence and mental stress at work explained 58% of working ability and had indirect effects on general subjective well-being. Self-confidence, mood and working ability had a direct effect on general subjective well-being. The prerequisites of physical functioning are important in maintaining working ability, particularly in aging workers, and psychological prerequisites of functioning are of even greater importance in maintaining general subjective well-being. (**Tuulikki Sjogren-Ronak** et.al.(2002)

**Wood,** et al. (2013), investigated that the Heavy workloads have been central to the discussion of well-being. However, fluctuations in workloads have received sparse attention, even though transient and routine levels of workloads may have independent effects on well-being. Findings are that both routine and transient levels of work to non-work interference mediated the job demands–calmness relationship. Work to non-work interference also negatively mediated the hours worked–calmness relationship, but the direct relationship between hours worked and calmness was a positive one so the mediating effect reduced this positive effect. In the case of enthusiasm, which was a second measure of well-being, there were no mediating effects but both routine and non-routine levels of job demands and transient levels of hours worked were related to it. The study highlights the value of introducing the temporal dimension into the study of the

work– non work interface, and the diversity of relationships that occur across different dimensions of workload and well-being.

**Syrek, et al. (2013),** investigated transformational leadership as a potential moderator of the negative relationship of time pressure to work–life balance and of the positive relationship between time pressure and exhaustion. Findings are that under high transformational leadership the impact of time pressure on exhaustion and work–life balance was less strong. The results of this study suggest that, particularly under high time pressure, transformational leadership is an important factor for both employees' work–life balance and exhaustion.

**Berkman,** et al. (2010), determined whether employees in extended care settings whose managers are supportive, open, and creative about work–family needs, such as flexibility with work schedules, have lower cardiovascular disease (CVD) risk and longer sleep than their less supported counterparts. Employee outcomes are sleep duration (actigraphy) and CVD risk assessed by blood cholesterol, high glycosylated hemoglobin/diabetes, blood pressure/hypertension, body-mass index, and tobacco consumption. Employees whose managers were less supportive slept less (29 min/day) and were over twice as likely to have 2 or more CVD risk factors (ORs = 2.1 and 2.03 for low and middle manager work–family scores, respectively) than employees whose managers were most open and creative. Managers' attitudes and practices may affect employee health, including sleep duration and CVD risk.

A Study by **Berkman,** et al. (2010) examined whether job control moderated the association between stress indicators (distress and sleeping problems) and intentions to change profession among 2,650 Finnish physicians. The authors found that high levels of distress and sleeping problems were associated with higher levels of intentions to change profession, whereas high job control was associated with lower levels of intentions to change profession even after adjusting for the effects of gender, age, and employment sector. In addition, high job control was able to mitigate the positive association that distress and sleeping problems had with intentions to change profession. The findings

highlight the importance of offering more job control to physicians to prevent unnecessary physician turnover.

## DEFINING PERSONALITY

Personality refer to individual difference in characteristics patterns of thinking, feeling, and behaving. The study of personality focuses on two broad areas. One is understanding individual differences in particular personality characteristics, such as sociability or irritability. The other is understanding how the various parts of a person come together as a whole.

**Selby, (2013)** examined the experience of chronic sleep disturbances of those with borderline personality disorder (DPD) and further establishing this association may be pertinent to enhancing current treatments, give the relevance of sleep to emotion regulation and stress management finding are BPD was significantly associated with all 3 chronic sleep problems assessed, as well as with the consequences of poor sleep. BPD symptoms interacted with chronic sleep problems to predict elevated social/emotional, cognitive, and self-care impairment.

**Wojnar, et al. (2009)** to examine the association between self-reported sleep difficulties and suicidality in the united states. The WHO composite international diagnostic interview was used to assess sleep problems and suicidality in the National Co-morbidity Survey Replication (NCS-R). Results of the study showed that sleep problems was significantly related to each measure of suicidality. Including sucidal ideation (OR=2.1), planning (OR=2.6), and suicide attempts (OR=2.5). Early morning awakening was associated with suicidal ideation and planning (ORs=1.9 for ideation; 2.2 for planning), whiel difficulty maintaining sleep arising. The night was a significant predictor of suicidal ideation and suicide attempts (Ors = 2.0 for ideation; 3.0 for attempts)

**Bruni, et al., (2006)** study examined the relationships between academic achievement, sleep, temperament and demographic-historical data in school-age children. Teachers were asked to fill out the teacher temperament questionnaire and a form for school

achievement, while mothers filled out a demographic-historical form and the sleep disturbance scale for children (SDSC), a 26-item questionnaire that consisted of six factors: difficulty in initiating and maintaining sleep (DIMS), sleep breathing disorders (SBD), arousal disorders (DA), sleep-wake transition disorders (SWTD), disorders of excessive somnolence (DOES), sleep hyperhydrosis (SHY).

A significant gender difference was found: females have higher SAI than males. The analysis of the demographic-historical form showed that only two factors appeared to affect SAI score: enuresis and the low educational level of the mother. The pattern of correlations showed that (a) the SAI was negatively related to the SDSC total score, in particular to DIMS and DOES sub-factors, and (b) the SAI was significantly and positively correlated with the temperamental traits of task-orientation and personal-social flexibility. A multiple stepwise regression analysis showed that the temperamental traits task-orientation and personal-social flexibility are the most predictive factors for SAI while the mother's educational level and the SDSC total score, although they contributed significantly to the prediction of SAI, accounted for only a small portion of variance.

**DEFINING SELF–EFFICACY**

A learned personality characteristics : The belief in one's own ability to control events that affect one's life and to handle demands in a satisfactory manner. (**Bandura**, **1997)**

**Ali Mostafai et al., (2012)** The relationship between self-efficacy and its sub scale with mental health in university student : Research method was descriptive correlation study 321 university students randomly selected. Measurement deviser were Goldberg's general health questionnaire and general self-efficacy scale. Data analyzed by Pearson's correlation coefficient and regression. Result showed that self-efficacy has a positive correlation with general health and social functions, and have a negative correlation with somatic symptoms, anxiety and sleep disorder, and depression symptoms.

**Rutledge, et al. (2013)** To identify factors impacting self-efficacy for sleep. Specifically, the aims were to examine associations between self-efficacy for sleep and (1) socio-demographic variables and (2) potential predictors including sleep severity, depression,

dysfunctional beliefs about sleep, quality of life/health status and insomnia treatment acceptability for behavioural treatment. A significant association was found between sleep self-efficacy and race ($p < 0{\cdot}01$). All predicator variables except one were found to be significantly correlated with the self-efficacy for sleep ($p < 0{\cdot}01$).

**Schlarb, et al. (2012)** Sleep problems, especially insomnia, are a common complaint among adults. International studies on university students have shown prevalence rates between 4.7% and 36.2% for sleep difficulties, and 13.1% and 28.1% for insomnia. Sleep problems are associated with lower social and academic performance and can have a severe impact on psychological and physical health. The goal of this study was to outline sleep characteristics, prevalence of sleep problems, insomnia, and associations with self-efficacy among German university students. Analyses revealed that more than 16% of surveyed students needed more than 30 minutes to fall asleep. About 7.7% of the students suffered from insomnia. Short sleep was significantly associated with a considerably increased rate of insomnia (20%). Insomniacs showed lower self-efficacy than students without sleep problems.

**Rationale of the Study :**

Sleep is essential for a person's health and well being. Sleep loss and sleep disorders affect an individual's performance, safety and quality of life. Slip related problems affect millions of people in all walk in life. They have major impact on society. Yet we still don't have a good understanding of exactly why we sleep or what causes sleep disorders.

Sleep is vital to our well-being and closely linked with serious health and mood problems such as high blood pressure, obesity, cardio vascular diseases and depression.

Patients of sleep disorders are almost in every country Indians are liss aware of this problem in comparison to other countries. Most of the people suffering from sleep disorders go to doctors for their psychologist because of lack of awareness about sleep disorders and they unnecessary take sleeping and other activities like Drugs, Alcohol intake. Sleeping disorders change their whole life style and they are prone to many other problems like social, physical, mental, emotional, related to work productivity in

workplace. In short in changed of a person whole personality these reasons selecting this for research work knowing these type of problems in people. In research to go in depth to explore out causes of their problems related to sleep disorders. Impact of sleep disorders on mental health occupational well being self efficacy and personality slow sleeping to this purpose study will help to understand the importance and will help the people to overcome the problems related to sleeping disorders.

## OBJECTIVES OF THE STUDY

1. To examine the influence of mental health in these patients.
2. To study the role of well-being in certain sleep disorders.
3. To investigate the importance of self-efficacy in sleep disorders.
4. To explore the role of personality in sleeping disorders.
5. To study the role of gender in above selected variables.

To fulfill the above aims the following hypotheses has been formulated :

**Hypothesis**

$H_{01}$ : The patients with sleep disorder will differ significantly from normal controls on well being.

$H_{02}$ : The patient with sleep disorder and normal controls will differ significantly on mental health.

$H_{03}$ : The influence of self-efficacy will be significantly different in patients with sleep disorders and normal controls.

$H_{04}$ : Some personality constellations will be significantly different (group) the patients with sleep disorders and normal controls.

$H_{05}$ : There will be difference on well-being, Mental Health, Self-efficacy and Personality of the patient's with the Sleep Disorders and Normal Controls owing to Gender.

# METHODOLOGY

**Sample :**

The total number of study sample consists of 240 patients. The study sample will consists 120 cases in each of the four categories of sleep disorder taken from different hospitals/clinic situated in Bikaner and Udaipur cities. A total number of 120 patients with sleep disorder will be obtain the disorders included in the study will be : A group of 120 normal subjects matched with patients with sleep disorder in terms of age sex, socio-economic status, occupation will be also taken.

The subjects will be selected with the following criteria of inclusion and omission :

(1) All young and old subject will be excluded the sample will be restricted to the age group of 35 to 50 years.

(2) Minimum education criteria of subjects will be at least graduation.

(3) All subject belonging to middle socio-economic status with an urban domicile.

(4) Subject suffering from other psychiatric illnesses will be excluded with the help of a psychiatric consultant.

**Sampling**

In the present studies purposive sampling technique will be used for collecting the sample. In order to make a comparison of the effect of the sleep disorders on selective variables the four groups (Insomnia, Sleep-Apnea, Narcolepsy and PLMD) with equal

number of different sleep disorders will be taken to make the comparison more effective and easy.

**Design of the study :**

The design of the study will be multi-group design.

| | Experiential Group (N=240) | | | | Normal controls (N=120) |
|---|---|---|---|---|---|
| Measures/Categories | Insomnia (N=30) | Sleep – Apnea (N=30) | Narcolepsy (N=30) | PLMD (N=30) | |
| Sleep disorder | | | | | |
| Well-being | | | | | |
| Mental health | | | | | |
| Personality | | | | | |
| Self-efficacy | | | | | |

The study will include two group viz. (a) Experimental group (b) Normal group

The patient of sleep disorder will be included in experimental group while the normal subject will be included in the control group and the both groups will be compared on certain psychological majors like sleep disorders, mental health, well being, personality, self-efficacy.

**Measures of the study:**

1. Sleep Disorder Screening Questionnaire (2010)-E**mory Health Care Centre and Academic Medical College, Atlanta, Georgia**.

2. Pareek Udai, (1988) Personal Effectiveness Scale (PE Scale-S) DN Pestponjee, Handbook of Psychological and Social Instrument. Concept : New Delhi. It measure effective and ineffective dimensions of the persons behaviour in the area of self discloser openness to feedback and perfectiveness.

3. Costa and Mcrae (1988) NEO-PI-R Personality Scale.

4. Arun Kumar Singh, Alpana Sen Gupta (2000). **Mental Health Battery (MHB).**

5. S.K. Verma, Anita Verma (2009). **DGI-General Well-being Major Scale**.

6. Kaliya Ashok, Sahu Sudhir(2013). **Socio Economic Status Scale**. .Agra: National Psychological Corporation.

**Statistical analysis**

1. Mean

2. Standard deviation

3. ANOVA

4. Any other higher statistics according to the data

# REFERENCES


- Ali, M., Mohiadin, M., Mohamm, A., Ahmad, M. (2012). The relationship between self-efficacy and its sub-scale with mental health in university student. *Annals of biological research*, 3(5), 2433-2438.

- American Psychiatric Association (2000). *Diagnostic and Statistical Manual of Mental Disorders.(4th ed., text revision)* Washington DC: American Psychiatric Association.

- American Sleep Disorders Association (1997) *ICSD-International Classification of Sleep Disorders, Revised: Diagnostic and Coding Manual.* Rochester, MN: American Sleep Disorders Association.

- Arun Kumar Singh, Alpana Sen Gupta (2000) Mental Health Battery (MHB).

- Baik, J.S., Ma, H.I. (2012). Sleep problems in Korean Parkinson's disease patients with PD sleep scale. *Movement Disorders,* 27 (1) :671.

- Berkman, Lisa, F., Buxton, Orfeu, Ertel, Karen, Cassandra (2010). Managers Practices related to work-family Balance Predict Employee cardiovascular risk and sleep duration in extended care setting. *Journal of occupational health psychology,* 15(3), 316-329.

- Bixler, E.O., Vgontzas, A.N., Lin H.M., Vela, B.A., Kales, A. (2002) Insomnia in central Pennsylvania. *Journal of Psychosomatic research* (53), 589-592.

- Cheng, M.H., Hsucy, Wang, S.J., Lee, S.J., Wang, P.H., (2008). The relationship of self-reported sleep disturbance, mood, and menopause in a community study. Department of obstetrics and Gynecology, Taipei Veterans General Hospital, Taiwan, 15 (50), 958-62.

- Costa and Mcrae (1988) NEO-PI-R Personality Scale

- Deborah, R. (2013). Experts say exposure to artificial light from tablet is causing sleep disorder Dibetes care. *diabetes journal .org,* 27 (10), 2464-2469.

- Howland, R.H. (1997). Sleep-onset rapid eye movement periods in neuropsychiatric disorders: implications for the pathophysiology of psychosis. *Journal of Nervous and Mental Disease,* 185, 730–738.

- Hystad, Sigurd W., Eid, Jarle, Brevik, John, I. (2011). Effect of Psychological hardiness, job demands, and job control on sickness absence. *Journal of Occupational health psychology,* 16(3), 265-278.

- Kaliya Ashok, Sahu Sudhir(2013). Socio Economic Status Scale. .Agra: National Psychological Corporation.

- Karlson, B., Eek, F., Palle, Kai (2009). Effect on sleep-related problem and self-reported health after a change of shift schedule. *Journal of occupational health psychology*, 14(2), 97-109.

- Krishnan V., Collop, N.A. (2006). Gender differences in sleep disorders, *Pulm Med*., 12(6) 383-9.

- Mahowald, M. W., Schenck, C. H. (1992). Dissociated states of wakefulness and sleep. *Neurology,* 42(6), 44-52.

- Meier, Lauren Z.L., Gross, Sven, Spector, Paul E., Semmer, Norbet K. (2013). Relationship and task conflict at work: Interactive short term effect on angry mood and somatic complaints. *Journal of occupational health psychology,* 18(2), 144-156.

- Obermeyer, W.H. & Benca, R.M. (1996). Effects of drugs on sleep. *Neurological Clinics*, 14, 827-840.

- Pareek Udai, (1988) Personal Effectiveness Scale (PE Scale-S) DN Pestponjee, Handbook of Psychological and Social Instrument. Concept : New Delhi. It measure effective and ineffective dimensions of the persons behaviour in the area of self discloser openness to feedback and perfectiveness

- Parish, J.M. (2009). sleep-related problem in common medical conditions. *Department of Internal Medicine, Division of Pulmonary Medicine*, Sleep Disorder Center, Mayo Clinic, Scottsdale, 135(2)563-72.

- Partinen, M., Hublin, C. (2005). Epidemiology of sleep disorders. Elsevier, Saunders, Philadelphia

- Querstret, Dawn, Cropley, Mark (2012). Exploring the relationship between work-related rumination, sleep quality, and work –related fatigue. *Journal of Occupational health psychology*, 17(3), 341-353.

- Rebecca, A. Bernet, Thomas, E. Joiner (2007). Sleep disturbance and suicide risk. *Neuropsychiatric Diseases and treatment*, 3(6), 735-743.

- *Regenstein, Q.R. & Monk, T.H. (1995). Delayed sleep phase syndrome: a review of its clinical aspects. American Journal of Psychiatry, 152, 602-608.*

- Rutledge, C.M., La, G., A.C., Bluestein, O. (2013). Predictors of self efficacy for sleep in primary care. *Journal of Clinical Nurs*, 22(10), 1254-61.

- Saksvik, Ingvild Berg, Bjorvatn, Harvey, Allison G., Waage, Siri, Harris, Anette, Pallesen, stale (2011). Adaptation and re-adaptation to different shift work schedules measured with sleep diary and actigraphy. *Occupational Health psychology*, 16(3), 331-344.

- Sarah, C.O., Butterworth, P., Liana, S.L., Margaret, K. and Jane P. (2013). Mental health affects future employment as job loss affects mental health: findings from a longitudinal population *BMC Psychiatry*, 13:144 doi:10.1186/1471-244X-13-144.

- Saravanan. Ram, Hazem Seirawan, Satish K.S. Glennt. Clark (2009). Prevalence and impact of sleep disorders and sleep habbits in the United State. *Journal Sleep and Breathing*, 14(1), 63-70.

- Schlasb, A.A. Kulessa, D., Gulewitsch, M.D., (2012) Sleep problem and association of Self-efficacy among German University Student (4), 1-7.

- Schoenborn, C.A., Adams, P.F. (2010) Health behaviors of adults: United States, 2005–2007. National Center for Health Statistics. *Vital Health Stat* 10(245).

- Selby, E.A. (2013). Chronic slip disturbances and borderline personality disorder symptoms. *Journals of consulting and clinical psychology*, 81(5), 941-947.

- Sjogren. R., Markku, T., Ojanen, Esko, K.L., Sirpa, T.M., Esko, A.M., (2002). Physical and Psychological prerequisites of functioning in relation to working ability and General subjective well being among office worker. Department of Health Science, University of Jyuaskyla, Finald.

- S.K. Verma, Anita Verma (2009) DGI-General Well-being Major Scale.

- Sleep Disorder Screening Questionnaire (2010)**-E**mory Health Care Centre and Academic Medical College, Atlanta, Georgia**.**

- Syrek, C.J., Apostel, E.A., Conny, H. (2013). Stress in highly demanding it Jobs ; Transformation leadership moderates the impact of time pressure on exhaustion and work life balance. *Journal of occupational health psychology,* 18(3), 252-261.

- US Department of Transportation, National Highway Traffic Safety Administration, National Center on Sleep Disorders Research, National Heart Lung and Blood Institute. *Drowsy driving and automobile crashes* [National Highway Traffic Safety Administration Web Site]. Accessed February 10, 2011.

- Wirtz, P.H., Ehlert, U., Kotlwiz, M.U. (2013). Occupational role stress is associated with higher cortisol reactivity to acute stress. *Journal of occupational health psychology,* 18(2), 121-131.

- Wood, S., Michaelides, G., Totterdell, P. (2013). The Impact of fluctuating workloads on well-being and the mediating role of work-non work interference in the relationship. *Journal of occupational health psychology,* 18(1), 106-119.

- Youth Risk Behavior Surveillance-United States, (2009). *MMWR* National Centre for Chronic disease and health, CDC, (59) SS-5.